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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/520,674	09/02/2005	Richard Merken-Schiller	HO-P03085US0	9393

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EXAMINER

GERRITY, STEPHEN FRANCIS

ART UNIT PAPER NUMBER

3721

DATE MAILED: 10/31/2006

Please find below and/or attached an Office communication concerning this application or proceeding.

**Office Action Summary**

Application No.

10/520,674

Applicant(s)

MERKEN-SCHILLER ET AL.

Examiner

Stephen F. Gerrity

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-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --  
Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

**Status**

- 1) ☒ Responsive to communication(s) filed on 10 January 2005.
- 2a) ☐ This action is **FINAL**. 2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

**Disposition of Claims**

- 4) ☒ Claim(s) 1-15 is/are pending in the application.
- 4a) Of the above claim(s) 12-15 is/are withdrawn from consideration.
- 5) ☐ Claim(s) \_\_\_\_\_ is/are allowed.
- 6) ☒ Claim(s) 1-11 is/are rejected.
- 7) ☐ Claim(s) \_\_\_\_\_ is/are objected to.
- 8) ☒ Claim(s) 1-15 are subject to restriction and/or election requirement.

**Application Papers**

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☒ The drawing(s) filed on 10 January 2005 is/are: a) ☐ accepted or b) ☒ objected to by the Examiner.  
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).  
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

**Priority under 35 U.S.C. § 119**

- 12) ☒ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☒ All b) ☐ Some \* c) ☐ None of:
- ☐ Certified copies of the priority documents have been received.
  - ☐ Certified copies of the priority documents have been received in Application No. \_\_\_\_\_.
  - ☒ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).
- \* See the attached detailed Office action for a list of the certified copies not received.

**Attachment(s)**

- 1) ☒ Notice of References Cited (PTO-892)
- 2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
- 3) ☒ Information Disclosure Statement(s) (PTO/SB/08)  
Paper No(s)/Mail Date 8/2/05.
- 4) ☐ Interview Summary (PTO-413)  
Paper No(s)/Mail Date. \_\_\_\_\_.
- 5) ☐ Notice of Informal Patent Application
- 6) ☐ Other: \_\_\_\_\_.

## DETAILED ACTION

### Election/Restrictions

1. Restriction is required under 35 U.S.C. 121 and 372.

This application contains the following inventions or groups of inventions which are not so linked as to form a single general inventive concept under PCT Rule 13.1.

In accordance with 37 CFR 1.499, applicant is required, in reply to this action, to elect a single invention to which the claims must be restricted.

Group I, claims 1-11, drawn to a method and apparatus for wrapping a product in film.

Group II, claims 12-15, drawn to a wrapped product.

2. The inventions listed as Groups I and II do not relate to a single general inventive concept under PCT Rule 13.1 because, under PCT Rule 13.2, they lack the same or corresponding special technical features for the following reasons:

Group I has the special technical feature of ultrasonically sealing and ultrasonically separating the film wrapper; and

Group II has the special technical feature of a pull-tab on the wrapped product.

3. During a telephone conversation with Ms. Jan Simpson (applicant's attorney) on 5 October 2006 a provisional election was made **with** traverse to prosecute the invention of Group I, claims 1-11. Affirmation of this election must be made by applicant in replying to this Office action. Claims 12-15 stand withdrawn from further consideration by the examiner, 37 CFR 1.142(b), as being drawn to a non-elected invention.

4. Applicant is reminded that upon the cancellation of claims to a non-elected invention, the inventorship must be amended in compliance with 37 CFR 1.48(b) if one

or more of the currently named inventors is no longer an inventor of at least one claim remaining in the application. Any amendment of inventorship must be accompanied by a request under 37 CFR 1.48(b) and by the fee required under 37 CFR 1.17(i).

#### **Response to Preliminary Amendment**

5. Receipt is acknowledged of a preliminary amendment, filed 10 January 2005, which has been placed of record and entered in the file.

#### **Information Disclosure Statement**

6. Receipt is acknowledged of an Information Disclosure Statement, filed 2 August 2005, which has been placed of record in the file. An initialed, signed and dated copy of the PTO-1449 form is attached to this Office action.

#### **Drawings**

7. The drawings are objected to under 37 CFR 1.83(a). The drawings must show every feature of the invention specified in the claims. Therefore, the ultrasonic welding and/or ultrasonic separation are performed with a pressure roller disposed opposite and plane parallel to the supporting table (claim 4); and an opposing supporting roller (claim 11) must be shown or the feature(s) canceled from the claim(s). No new matter should be entered.

Corrected drawing sheets in compliance with 37 CFR 1.121(d) are required in reply to the Office action to avoid abandonment of the application. Any amended replacement drawing sheet should include all of the figures appearing on the immediate prior version of the sheet, even if only one figure is being amended. The figure or figure number of an amended drawing should not be labeled as "amended." If a drawing figure

is to be canceled, the appropriate figure must be removed from the replacement sheet, and where necessary, the remaining figures must be renumbered and appropriate changes made to the brief description of the several views of the drawings for consistency. Additional replacement sheets may be necessary to show the renumbering of the remaining figures. Each drawing sheet submitted after the filing date of an application must be labeled in the top margin as either "Replacement Sheet" or "New Sheet" pursuant to 37 CFR 1.121(d). If the changes are not accepted by the examiner, the applicant will be notified and informed of any required corrective action in the next Office action. The objection to the drawings will not be held in abeyance.

**Claim Rejections - 35 USC § 101 and 112, 2<sup>nd</sup> paragraph**

**8. 35 U.S.C. 101 reads as follows:**

Whoever invents or discovers any new and useful process, machine, manufacture, or composition of matter, or any new and useful improvement thereof, may obtain a patent therefor, subject to the conditions and requirements of this title.

**35 U.S.C. 112, 2<sup>nd</sup> paragraph reads as follows:**

The specification shall conclude with one or more claims particularly pointing out and distinctly claiming the subject matter which the applicant regards as his invention.

**9. Claims 6-11 are rejected under 35 U.S.C. 101 because the claimed invention is directed to non-statutory subject matter.**

Claims 6-11 are rejected under 35 U.S.C. 101 because the subject matter is directed to neither a "machine" nor a "process". Each of claims 6 and 11 recites "device for wrapping products in films according to the method as claimed in claim 1" in lines 1-3, this recitation in both claims embraces or overlaps two different statutory classes of invention, namely a "machine" and "process", and thus fails to conform with 35 U.S.C.

101 which is drafted so as to set forth the statutory classes of invention in the alternative only.

Additionally, claims 6-11 are rejected under 35 USC. 112, 2<sup>nd</sup> paragraph as being indefinite because each of claims 6 and 11 recites "device for wrapping products in films according to the method as claimed in claim 1" which makes claims 6-11 ambiguous. Ex parte Lyell, 17 USPQ2d 1548 (BPAI 1990). See **MPEP § 2173.05(p)(II)**.

### **Claim Rejections - 35 USC § 112**

**10.** The following is a quotation of the second paragraph of 35 U.S.C. 112:

The specification shall conclude with one or more claims particularly pointing out and distinctly claiming the subject matter which the applicant regards as his invention.

**11.** Claims 2-4 and 6-11 are rejected under 35 U.S.C. 112, second paragraph, as being indefinite for failing to particularly point out and distinctly claim the subject matter which applicant regards as the invention.

Claim 2, lines 3 and 7, the recitation "ultrasonic cutting" lacks proper antecedent basis in the claims; claim 1 recites "ultrasonically separating".

Claim 3, lines 6-8, the recitations "the welding and cutting edges of the welding punch" and "the welded and cut edges of the wrapped products" each lack proper antecedent basis in the claims.

Claim 4, lines 2-8, the recitation "the ultrasonic welding and/or ultrasonic separation are performed with a pressure roller disposed opposite and plane-parallel to the supporting table above one film, said pressure roller being guided across said film according to the contours to be welded and cut, with pressure exerted on the supporting table for ultrasonic welding and/or ultrasonic separation" renders the claim vague and

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indefinite. Claim 4 depends from claim 2 which recites the use of a welding punch. It is unclear from the claimed subject matter of claim 4 how the welding can be performed by the use of a welding punch and a pressure roller. Clarification or amendment to claim 4 is required; perhaps claim 4 should depend from claim 1 as opposed to claim 2, and with additional changes to the recitation of the supporting table.

Claim 6, lines 16 and 17, the recitation "as an image of the welded and cut edges of the wrapped products" renders the claim vague and indefinite because the punch and table create the welded and cut edges of the wrapped product. The claim reads as if the welded and cut edges of the wrapped products already exist.

Claim 6, line 17, "mounted on the table" should perhaps be changed to --mounted above the table-- so that the claim will distinctly claim the invention.

Claim 6, lines 20 and 21, the recitation "the products held between them" should perhaps be changed to --the products held therebetween--.

Claim 9, line 4, "the pull-tab" lacks antecedent basis. It is suggested that claim 9 be amended to depend from claim 8 as opposed to claim 6.

Claim 11, lines 9 and 10, the recitation "the products held between them" should perhaps be changed to --the products held therebetween--.

Claim 11, line 10, the recitation "can be disposed" renders the claim vague and indefinite because it is unclear as to what is meant by "disposed" relative to the remainder of the claimed subject matter. It is unclear from the claimed subject matter as to why the sheets are "disposed" between the table and roller.

These and any other informalities should be corrected so that the claims may particularly point out and distinctly claim the subject matter which applicant regards as the invention, as required by 35 U.S.C. § 112, second paragraph.

### **Claim Rejections - 35 USC § 102**

**12.** The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless –

(b) the invention was patented or described in a printed publication in this or a foreign country or in public use or on sale in this country, more than one year prior to the date of application for patent in the United States.

**13.** Claims 1, 2 and 5 are rejected under 35 U.S.C. 102(b) as being anticipated by Miura et al.(**JP 3-158227**).

The Miura reference discloses positioning (at b) products on a first sheet of film (polypropylene film 1) continuously advanced; covering the products with a second sheet of film (foil 5) which is continuously advanced and which is aligned plane-parallel with the first sheet of film (1); ultrasonically welding the first and second films on the outer edges of each of the product wrappings (at c) and ultrasonically separating the overlapping films at selected positions (see translated abstract); and separating the wrapped products (see translated abstract).

Regarding claim 2, as seen in figure 1, the welding punch (6a) and supporting table (6b) move towards and away from one another to ultrasonically weld and cut the product wrappings.

Regarding claim 5, as seen in figure 1, the first film (1) is pre-formed (by molding at a) to produce pockets (2) for the products introduced (at 4).



**Claim Rejections - 35 USC § 103**

**14.** The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

**15.** Claims 3, 6 and 7 are rejected under 35 U.S.C. 103(a) as being unpatentable over Miura et al.(**JP 3-158227**) in view of Tyrrell (**US 3,454,450**).

The Miura reference discloses positioning (at b) products on a first sheet of film (polypropylene film 1) continuously advanced; covering the products with a second sheet of film (foil 5) which is continuously advanced and which is aligned plane-parallel with the first sheet of film (1); ultrasonically welding the first and second films on the outer edges of each of the product wrappings (at c) and ultrasonically separating the overlapping films at selected positions (see translated abstract); and separating the wrapped products (see translated abstract); as seen in figure 1, the welding punch (6a) and supporting table (6b) move towards and away from one another to ultrasonically weld and cut the product wrappings; and as seen in figure 1, the first film (1) is pre-formed (by molding at a) to produce pockets (2) for the products introduced (at 4). The Miura et al. reference meets all of applicant's claimed subject matter, but does disclose generating an ultrasonic oscillation on the surface of the supporting table with a sonotrode device integrated in the supporting table. The Tyrrell reference discloses that it is old and well known in the relevant art to integrate a sonotrode (see fig. 3 - the disclosed transducer is equivalent to applicant's term sonotrode (i.e. horn)) in the

supporting table for generating ultrasonic oscillation on the supporting table (13), for the purpose of cooperating with the bar (11) for welding and cutting the plastic material - see col. 2, line 44 through col. 3, line 4. It would have been obvious to one having ordinary skill in the art, at the time applicant's invention was made, to have modified the Miura et al. reference by having had a sonotrode integrated into the supporting table (6b) for generating ultrasonic oscillation on the surface of the supporting table, as taught by Tyrrell, in order to weld and cut the two film sheets. The Tyrrell reference recognizing the substitution or repositioning of the sonotrode (i.e. horn) either above or below the material to be welded and cut

**16.** Claim 8 is rejected under 35 U.S.C. 103(a) as being unpatentable over the prior art, as applied to claim 6 above, and further in view of Copland (**US 4,684,025**).

The Miura et al. device, as modified by Tyrrell above, meets all of applicant's claimed subject matter with the exception of the forming of a pull-tab in an area where the films are not sealed. The Copland reference discloses a similar type of machine including a sealing arrangement (see figure 5) for ultrasonic welding the two films together (see col. 5, line 63 through col. 6, line 15) with a pull-tab (86) formed on an outer edge of the product wrapping where the films are not sealed together (see fig. 7 and col. 6, lines 47-59). It would have been obvious to one having ordinary skill in the art, at the time applicant's invention was made, to have further modified the Miura et al. device by having had welding structure form a pull-tab in an outer edge of the product wrapping where the films are not sealed together, as taught by Copland, in order to produce an easy opening product.

**Allowable Subject Matter**

17. Claims 4 and 9-11 would be allowable if rewritten to overcome the rejection(s) under 35 U.S.C. 112, 2nd paragraph, set forth in this Office action and to include all of the limitations of the base claim and any intervening claims.

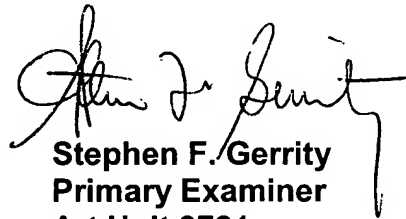
**Conclusion**

18. The prior art made of record and not relied upon is considered pertinent to applicant's disclosure. The references listed on the attached form (PTO-892) are cited to show ultrasonic welding and cutting, as well as packaging methods and devices. All are cited as being of interest and to show the state of the prior art.

19. Any inquiry concerning this communication or earlier communications from the examiner should be directed to Stephen F. Gerrity whose telephone number is 571-272-4460. The examiner can normally be reached on Monday - Friday from 5:30 - 2:00.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Rinaldi Rada can be reached on 571-272-4467. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.



**Stephen F. Gerrity**  
Primary Examiner  
Art Unit 3721

30 October 2006